

What is claimed is:

1 1. A mobile phone antenna, comprising:
2 a first conductive radiation element that is formed in a sheet
3 metal conductor and resonates at a predetermined resonance
4 frequency;

5 a second conductive radiation element that is formed in the
6 sheet metal conductor and resonates at the predetermined resonance
7 frequency;

8 a ground that is connected through a conductive ground
9 connector with said second conductive radiation element;
10 wherein said ground is placed such that said ground is not
11 opposed to said first and second conductive radiation elements.

1 2. The mobile phone antenna according to claim 1, further
2 comprising a third conductive radiation element,

3 wherein said first conductive radiation element resonates at
4 a first resonance frequency and said third conductive radiation
5 element resonates at a second resonance frequency.

1 3. The mobile phone antenna according to claim 2, wherein
2 said third conductive radiation element is disposed at right
3 angle to a surface in which said first and second conductive
4 radiation elements are formed.

1 4. The mobile phone antenna according to claim 2, wherein
2 said ground includes: a first ground that is connected through
3 said conductive ground connector with said second conductive

4 radiation element; and a second ground that is connected through
5 a conductive inter-ground connector with said first ground, said
6 second ground being capable of rotating in the range of a
7 predetermined angle from a position that said second ground faces
8 in parallel said first ground; and

9 said conductive inter-ground connector is positioned under
10 said second conductive radiation element when said second ground
11 rotates by said predetermined angle.

1 5. The mobile phone antenna according to claim 1, wherein
2 said second conductive radiation element includes a coupling
3 adjuster that extends parallel to said first conductive radiation
4 element while having a predetermined clearance with said first
5 conductive radiation element;

6 said coupling adjuster has a length, a width and said
7 clearance to be adjusted such that said mobile phone antenna has
8 a predetermined resonance frequency and bandwidth.

1 6. The mobile phone antenna according to claim 5, wherein
2 said clearance is set 2mm or less.

1 7. The mobile phone antenna according to claim 2, wherein
2 said second conductive radiation element includes: a first
3 coupling adjuster that extends parallel to said first conductive
4 radiation element while having a first clearance with said first
5 conductive radiation element; and a second coupling adjuster that
6 extends parallel to said third radiation element while having a
7 second clearance with said third conductive radiation element; and

8 said first and second coupling adjusters have a length, a
9 width and said first and second clearances to be adjusted such that
10 said mobile phone antenna has a predetermined resonance frequency
11 and bandwidth.

1 8. The mobile phone antenna according to claim 7, wherein
2 said first and second clearances are set 2mm or less.

1 9. A mobile phone antenna for folding type mobile phone with
2 a pair of housings foldable, comprising:

3 a first ground that is installed in one of said pair of
4 housings;

5 a second ground that is installed in the other of said pair
6 of housings, said second ground being connected through a conductive
7 inter-ground connector with said first ground;

8 first and second conductive radiation elements that are
9 disposed at a position where said first and second conductive
10 radiation elements are not opposed to said first and second ground,
11 said first and second conductive radiation element resonating at
12 a predetermined resonance frequency; and

13 a conductive ground connector that electrically connects said
14 first ground with said second conductive radiation element.